

634-015

Dart Aerospace Ltd.

Date: Thursday, 23/10/2008 1:30:00 PM
 User: Julie Dawson

Process Sheet

| | | | |
|------------------------------------|--|---------------------------|--------------------|
| Customer : | CU-DAR001 Dart Helicopters Services | Drawing Name : | SKID TUBE ASSEMBLY |
| Job Number : | 42902A | | |
| Estimate Number : | 12520 | | |
| P.O. Number : | | Part Number : | D205634045 |
| This Issue : | 23/10/2008 | Drawing Number : | D2580 REV D |
| Prsht Rev. : | NC | Project Number : | N/A |
| First Issue : | 11 | Drawing Revision : | D |
| Previous Run : | 42901A | Material : | |
| Written By : | | Due Date : | 01/02/2009 |
| Checked & Approved By : | JLD 08.10.23 | Qty: | 1 Um: Each |
| Comment : | Est Rev:C Revised Steps 06-09-06 JLM Est Rev:D Added SS Wearplates & Gaskets 07-07-09 JLM | | |

Additional Product

Job Number:



| | | |
|----------------|------------------------------|----------------------|
| Seq. #: | Machine Or Operation: | Description : |
|----------------|------------------------------|----------------------|

| | | |
|-----|----|------------------|
| 1.0 | DC | DOCUMENT CONTROL |
|-----|----|------------------|



Comment: DOCUMENT CONTROL

Photocopy D205-634 bluefile & type labels per PPP D205-634-045 CHG002

| | | |
|-----|-----------|------------------------|
| 2.0 | D25001190 | Ext'n -1' Beam Tube 4" |
|-----|-----------|------------------------|



Comment: Qty.: 1.0000 Each(s)/Unit Total: 1.0000 Each(s)

Pick:

| | | | |
|-----|-------------|---------------------|---------|
| Qty | Part Number | Description | Batch |
| 1 | D2500-1-190 | Skid Tube Extrusion | B-37544 |

RT/MB 08-11-17

| | | |
|-----|-------|-------------------|
| 3.0 | D2596 | Web, 205 Skidtube |
|-----|-------|-------------------|



Comment: Qty.: 1.0000 Each(s)/Unit Total: 1.0000 Each(s)

Pick:

| | | | |
|-----|-------------|-------------|---------|
| Qty | Part Number | Description | Batch |
| 1 | D2596 | 205 Web | B-43371 |

AWM

8-11-30

| | | |
|-----|-------------|-----------------------|
| 4.0 | SKIDTUBES 1 | SKIDTUBESS RESOURCE 1 |
|-----|-------------|-----------------------|



Comment: LANDING GEAR RESOURCE 1

1- Inspect mat'l D2500-1-190 for damage

2-Cut D2500-1-190 per Dwg D2580 if necessary Debur ends

3-Drill pilot holes using drill jig DT 8149

JB 8-11-28

4-Acid etch and Alodine tube per QSI 005 4.1



RT/MB 08-11-17

| W/O: | | WORK ORDER CHANGES | | | | | |
|------|------|--------------------|----|------|-----|-------------------------------------|--------------------------|
| DATE | STEP | PROCEDURE CHANGE | By | Date | Qty | Approval Chief Eng / Prod Mgr | Approval QC Inspector |
| | | | | | | | |
| | | | | | | | |

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

| NCR: | | WORK ORDER NON-CONFORMANCE (NCR) | | | | | | |
|------|------|----------------------------------|-----------------------------|---------------------------------|----------------|---------------------------|-----------------------|--------------------------|
| DATE | STEP | Description of NC Section A | Corrective Action Section B | | | Verification Section C | Approval Chief Eng | Approval QC Inspector |
| | | | Initial Chief Eng | Action Description Chief Eng | Sign & Date | | | |
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User: Julie Dawson

Process Sheet

Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: SKID TUBE ASSEMBLY

Job Number: 42902A

Part Number: D205634045

Job Number:



Seq. #:

Machine Or Operation:

Description :

5-Open holes to 0.500" as per Dwg D2580 without cutting fluid

6-Countersink holes as per Dwg D2580 without cutting fluid

7-Deburr and blow out all chips from inside of tube

8-Add extra holes to web prior to bonding, per DEO 9183

9-Bond web in place per QSI 015. Allow 12 Hrs. cure time before cutting

Pick:

Qty Part Number Description Batch

A/R Sikaflex-291 M109883

Sikaflex expire date: 09-07-01

Start Time: 12:15 Date: 8-11-30

Fin Time: 2:00 Date: 8-12-01

AWM 8-11-30

5.0

BENDING

BENDING MACHINE - SKIDTUBES



Comment: BENDING MACHINE

1-Bend as per program D2580.C on CNC Bender and Folio FT009

2-Cut tubes as per Dwg. D2580

RT 08-12-01

6.0

SKIDTUBES 1

SKIDTUBESS RESOURCE 1



Comment: LANDING GEAR RESOURCE 1

1-Deburr ends after cutting. Remove alodine from around holes

2-Drill extra fwd hole as per DEO 9183 using
drill jig DT8461

3-Drill extra middle hole as per DEO 9183 using
drill jig DT8462

4-Drill pilot holes for aft cap using DT8215, ***DO NOT OPEN TO FINISH SIZE***

5-Drill extra aft holes as per DEO 9183 using
drill jig DT8463 locating from aft cap hole and aft saddle hole.

RF 08-12-02

| W/O: | | WORK ORDER CHANGES | | | | | | |
|------|------|--------------------|--|----|------|-----|-------------------------------------|--------------------------|
| DATE | STEP | PROCEDURE CHANGE | | By | Date | Qty | Approval Chief Eng / Prod Mgr | Approval QC Inspector |
| | | | | | | | | |
| | | | | | | | | |

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

QA: N/C Closed: _____ Date: _____

| NCR: | | WORK ORDER NON-CONFORMANCE (NCR) | | | | | | |
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Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: SKID TUBE ASSEMBLY

Job Number: 42902A

Part Number: D205634045

Job Number:



Seq. #:

Machine Or Operation:

Description :

7.0

QC5

INSPECT WORK TO CURRENT STEP



Comment: INSPECT WORK TO CURRENT STEP

BE 08/12/02

8.0

D25763

Step (maching detail)



Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

Pick:

| Qty | Part Number | Description | Batch |
|-----|-------------|-------------|--------|
| 1 | D2576-3 | Step | B38392 |

BE 08/12/02

9.0

D2579

Crossbolt Spacer



Comment: Qty.: 24.0000 Each(s)/Unit Total : 24.0000 Each(s)

Pick:

| Qty | Part Number | Description | Batch |
|-----|-------------|-------------|-------|
| 24 | D2579 | Spacers | B4666 |

BE 08/12/02

10.0

SKIDTUBES 1

SKIDTUBESS RESOURCE 1



Comment: LARGE FABRICATION RESOURCE 1

1-Prepare tube for welding D2576-3 Step Remove alodine as required.

BE 08/12/02

2-Weld step D2576 as per Dwg. D2580 and QSI 004

A/R Aluminum Rod

m/09813

BE 08/12/02

3-Weld crossbolt spacers D2579 as per Dwg. D2580 and QSI 004. For D2579

spacers, weld one

side, pass 3/8" drill, weld other side, pass 3/8" drill

A/R Aluminum Rod

m/09813

BE 08/12/02

4-Grind welds as per Dwg D2580 Grind flush ridge made from bending

5-Drill holes for wearplates using DT 8217 Open holes to 19/64", adjust stopper not to hit web. Deburr

DT8937

6-Counterbore crossbolt spacers to 7/16" ID x 1.0" deep as per Dwg D2580. Deburr holes

*****DO NOT COUNTERBORE EXTRA HOLES PUT IN AT STEP 13,14 AND 15 (LEAVE AT 0.384"Ø AS PER DEO 9183)****

P70

7-Open aft cap holes to #6 Drill bit. Deburr

8-Drill pilot holes for Tow ring using DT8091, open to .640" and Deburr

Jh 8-12-4

Dart Aerospace Ltd

| W/O: 42902A | | EST # 12520 | | WORK ORDER CHANGES | | | | | |
|-------------|------|--|--|--------------------|------|-----|------------------------------------|--------------------------------|--|
| DATE | STEP | PROCEDURE CHANGE | | By | Date | Qty | Approval Chief Eng/ Prod Mgr | Approval QC Inspector | |
| 08-12-02 | 10.5 | Include DT8937 to drill the fuel wearplate holes per drawing perm. change. | | | | | <i>[Signature]</i> 08-12-02 | <i>[Signature]</i> 08-12-02 | |
| | | | | | | | | | |

Part No: D205-634-045 PAR #: N/A Fault Category: Pod/Skylube NCR: (Yes) No DQA: DD Date: 09/01/07
QA: N/C Closed: DD Date: 09/01/07

| NCR: 42902A | | WORK ORDER NON-CONFORMANCE (NCR) | | | | | | |
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| 08-12-02 | 10.6 | The 4 holes (x-bolt spacers) were C'buried, like the rest. R.C. Employee did not read the instructions & was back and forth on his steps. Did the tube as per -041 | <i>[Signature]</i> 08/12/02 | Drill out all 4 affected x-bolt spacers, and replace B41666 - weld back into position as per drawing. A/R m109813 - Ensure to follow the w.o. step by step & change. | BE 08-12-03 JDS-12-2 | <i>[Signature]</i> 08/12/04 | <i>[Signature]</i> 08/12/02 | <i>[Signature]</i> 08-12-02 |
| | | | | | | | | |
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Process Sheet

Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: SKID TUBE ASSEMBLY

Job Number: 42902A

Part Number: D205634045

Job Number:



Seq. #:

Machine Or Operation:

Description :

11.0

QC10

VISUAL INSPECTION OF GROUND WELDS



Comment: VISUAL INSPECTION OF GROUND WELDS

S 08/12/04

(X)

12.0

QC5

INSPECT WORK TO CURRENT STEP



Comment: INSPECT WORK TO CURRENT STEP

S 08/12/04

(X)

13.0

HAND FINISHING1

HAND FINISHING RESOURCE #1



Comment: HAND FINISHING RESOURCE #1
Pressure wash as per QSI 005

HL

08-12-18

(X)

14.0

POWDER COATING

POWDER COATING



M 102316



(X)

Comment: POWDER COATING

Powder Coat ****GREEN****Sandtex (Ref: 4.3.5.8) as per QSI 005 4.3

START TIME:

3:30

OVEN TEMPERATURE:

320F

FINISH TIME:

4:00

M-L 08/12/18

15.0

QC3

INSPECT POWDER COAT/CHEMICAL CONVERSION



Comment: INSPECT POWDER COAT/CHEMICAL CONVERSION

09-05-01

(X)

16.0

D2855

Cap



Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

Cap

Batch: 1342806

HL

17.0

AN35A

Bolt



Comment: Qty.: 2.0000 Each(s)/Unit Total : 2.0000 Each(s)

Bolt

Batch: M100188

HL

09-05-01

(X)

| W/O: | | WORK ORDER CHANGES | | | | | | |
|------|------|--------------------|--|----|------|-----|-------------------------------------|--------------------------|
| DATE | STEP | PROCEDURE CHANGE | | By | Date | Qty | Approval Chief Eng / Prod Mgr | Approval QC Inspector |
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Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____
 QA: N/C Closed: _____ Date: _____

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Drawing Name: SKID TUBE ASSEMBLY

Job Number: 42902A

Part Number: D205634045

Job Number:



| Seq. #: | Machine Or Operation: | Description : |
|---------|-----------------------|---------------|
|---------|-----------------------|---------------|

| | | |
|------|------------|--------|
| 18.0 | AN960JD10L | Washer |
|------|------------|--------|



Comment: Qty.: 2.0000 Each(s)/Unit Total : 2.0000 Each(s)

Washer

Batch: M 105793

jd

| | | |
|------|-----------|--------|
| 19.0 | AN960C10L | washer |
|------|-----------|--------|



Comment: Qty.: 50.0000 Each(s)/Unit Total : 50.0000 Each(s)

washer

batch M 109798

jd

| | | |
|------|-------------|--------|
| 20.0 | ALS71032130 | Insert |
|------|-------------|--------|



Comment: Qty.: 50.0000 Each(s)/Unit Total : 50.0000 Each(s)

Insert

Batch: M 105819

jd

| | | |
|------|--------|------|
| 21.0 | AN3C4A | BOLT |
|------|--------|------|



Comment: Qty.: 50.0000 Each(s)/Unit Total : 50.0000 Each(s)

BOLT

Batch: M 110139

jd

| | | |
|------|---------|--------|
| 22.0 | D356613 | Gasket |
|------|---------|--------|



Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

GASKET

Batch: B42147

jd

| | | |
|------|--------|--------|
| 23.0 | D35665 | Gasket |
|------|--------|--------|



Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

GASKET

Batch: B43710

jd

| | | |
|------|--------|--------|
| 24.0 | D35661 | Gasket |
|------|--------|--------|



Comment: Qty.: 2.0000 Each(s)/Unit Total : 2.0000 Each(s)

GASKET

Batch: 1343709

jd

09 - 05 x1

(XL)

| W/O: | | WORK ORDER CHANGES | | | | | | |
|------|------|--------------------|--|----|------|-----|-------------------------------------|--------------------------|
| DATE | STEP | PROCEDURE CHANGE | | By | Date | Qty | Approval Chief Eng / Prod Mgr | Approval QC Inspector |
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Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

QA: N/C Closed: _____ Date: _____

| NCR: | | WORK ORDER NON-CONFORMANCE (NCR) | | | | | | |
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Process Sheet

Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: SKID TUBE ASSEMBLY

Job Number: 42902A

Part Number: D205634045

Job Number:



| Seq. #: | Machine Or Operation: | Description : |
|---------|-----------------------|---------------|
|---------|-----------------------|---------------|

| | | |
|------|---------|----------|
| 25.0 | D356413 | Wearshoe |
|------|---------|----------|



Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

WEARSHOE

Batch: 1342257 *YH*

| | | |
|------|---------|----------|
| 26.0 | D356411 | Wearshoe |
|------|---------|----------|



Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

WEARSHOE

Batch: 1343707 *YH*

| | | |
|------|--------|----------|
| 27.0 | D35649 | Wearshoe |
|------|--------|----------|



Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

WEARSHOE

Batch: 1343708 *YH*

| | | |
|------|--------|----------|
| 28.0 | D35645 | Wearshoe |
|------|--------|----------|



Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

WEARSHOE

Batch: 1343893 *YH*

| | | |
|------|--------|----------------------|
| 29.0 | D25943 | O-Ring, 205 Skidtube |
|------|--------|----------------------|



Comment: Qty.: 16.0000 Each(s)/Unit Total : 16.0000 Each(s)

O-Ring

Batch: 1329908 *YH*

| | | |
|------|--------|--------------------|
| 30.0 | D25941 | Plug, 205 Skidtube |
|------|--------|--------------------|



Comment: Qty.: 16.0000 Each(s)/Unit Total : 16.0000 Each(s)

Plug

Batch: (13x) 1335919 / (3x) 1342807 *YH*

| | | |
|------|-----------------|----------------------------|
| 31.0 | HAND FINISHING1 | HAND FINISHING RESOURCE #1 |
|------|-----------------|----------------------------|



Comment: HAND FINISHING RESOURCE #1.

1-Install inserts & wearplates as per Dwg. D2580. Use a drop of Sikaflex on insert holes before installing wearplates

A/R

Sikaflex-291

M110110

YH

08-05-01

YH

| W/O: | | WORK ORDER CHANGES | | | | | | |
|------|------|--------------------|--|----|------|-----|-------------------------------------|--------------------------|
| DATE | STEP | PROCEDURE CHANGE | | By | Date | Qty | Approval Chief Eng / Prod Mgr | Approval QC Inspector |
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| | | | | | | | | |

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

QA: N/C Closed: _____ Date: _____

| NCR: | | WORK ORDER NON-CONFORMANCE (NCR) | | | | | | |
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Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: SKID TUBE ASSEMBLY

Job Number: 42902A

Part Number: D205634045

Job Number:



Seq. #:

Machine Or Operation:

Description :

✓ Sikaflex expire date: 09/07

✓ 2-Coat D2594-3 O' rings with Petroleum Jelly and install on D2594-1 plugs as per Dwg D2580

✓ 3-Inspect for foreign object per QSI 024

✓ 4-Install 2855 Aft Cap as per Dwg D2580 and seal Fwd Step & Aft Cap with Sikaflex. Clean excess adhesive

A/R Sikaflex-291

M110110

✓ Sikaflex expire date: 09/07

5-Wing Walk as per Dwg D2580 and QSI 005 4.4

M189219

Batch:

FL 09/01/06 ①

32.0

QC5

INSPECT WORK TO CURRENT STEP



S 09/01/06 ①



Comment: Inspect Aft Cap, Fwd Step and Wing Walk of work to Current Step Inspect for Foreign objects per QSI 024

33.0

PACKAGING 1

PACKAGING RESOURCE #1



Comment: PACKAGING RESOURCE #1

Identify and pack for shipping as per PPP D205-634-045

Location:

PPP Rev:

PPP 42902

09/07/07 ①

34.0

QC21

FINAL INSPECTION/W/O RELEASE



Comment: FINAL INSPECTION/W/O RELEASE

09/01/07 ①

Job Completion



09.01.07

| W/O: | | WORK ORDER CHANGES | | | | | | |
|------|------|--------------------|--|----|------|-----|-------------------------------------|--------------------------|
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NOTE: Date & initial all entries

DART

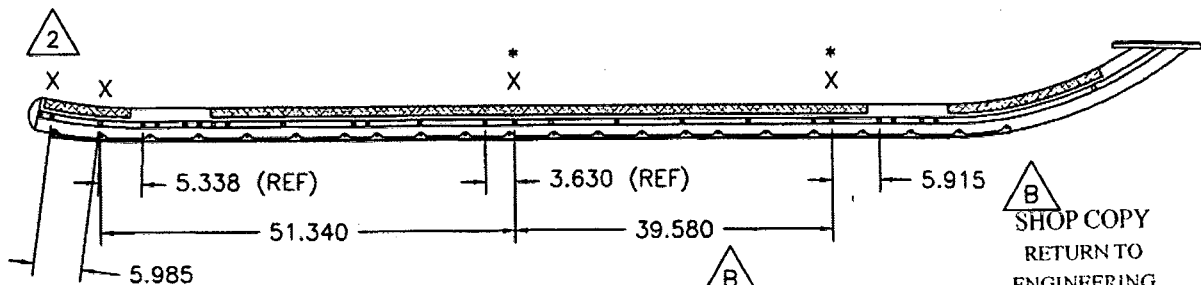
| | | | |
|------------------|----------------|---|------------------------|
| DESIGN RF | DRAWN BY RF | DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA | |
| CHECKED H | APPROVED H | DRAWING NO. DEO 9183 | REV. B SHEET 1 OF 1 |
| DATE 00.05.15 | | TITLE ADD SKIDTUBE P/N D2580-045 | SCALE NTS |
| A | 00.03.29 | NEW ISSUE | |
| B | 00.05.15 | 39.580 WAS 39.620 | |

DART ENGINEERING ORDER

AMEND DRAWING D2580 REV. C TO ADD D2580-045-ASSEMBLY

D2580-045 IS IDENTICAL TO D2580-041, EXCEPT FOR THE FOLLOWING CHANGES:

- 1) INSTALL CROSS BOLT SPACERS AT LOCATIONS MARKED 'X' ACCORDING TO THE FOLLOWING PROCEDURE.
 - a) DRILL $\varnothing 0.508$ HOLES AT LOCATIONS SHOWN BELOW MARKED 'X'. CHAMFER HOLES $0.030 \times 45^\circ$. NOTE THAT HOLES WILL ALSO HAVE TO BE TRANSFERRED TO THE D2596 WEB AT THE * LOCATIONS. IT IS ACCEPTABLE TO PRE-DRILL THE D2596 WEB IN THESE LOCATIONS BEFORE INSTALLING THE WEB IN THE SKIDTUBE. OPEN HOLES TO $\varnothing 0.63$ AND TOUCH UP WITH ALODINE PER QSI 005 4.1.
 - b) INSERT D2579 CROSS BOLT SPACERS INTO THE HOLES.
 - c) WELD INTO PLACE PER DART QSI 004 AND GRIND FLUSH.
 - d) REMOVE SPILL OVER LEAVING HOLE DIMENSION $\varnothing 0.380$ - $\varnothing 0.390$.
- 2) IT IS ACCEPTABLE TO GRIND A RELIEF IN THE D2855 AFT CAP TO PREVENT INTERFERENCE WITH THE SPACER AT THIS LOCATION.
- 3) POWDER COAT ENTIRE ASSEMBLY GREEN (REF. 4.3.5.8) PER DART QSI 005 4.3 INSTEAD OF WHITE (REF. 4.3.5.1).



△ B
SHOP COPY
RETURN TO
ENGINEERING
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SUBJECT TO AMENDMENT
WITHOUT NOTICE
WORK ORDER
NO. 42902A

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DART

| | | | |
|------------------------|-------------------------|--|------------------------|
| DESIGN RF | DRAWN BY RF | DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA | |
| CHECKED [Signature] | APPROVED [Signature] | DRAWING NO. DSI 9184 | REV. A SHEET 1 OF 1 |
| DATE 00.03.29 | | TITLE ADD SKIDTUBE P/N D205-634-015 SCALE NTS | |
| A | 00.03.29 | NEW ISSUE | |

DART SERVICE INSTRUCTION

TO AMEND INSTALLATION INSTRUCTIONS D205-634 REV. B.

REF. CANADIAN STA: SH96-88
US FAA STC: SR00563NY

ADD D205-634-015 INSTALLATION. PARTS LIST IS IDENTICAL
TO PARTS LIST FOR D205-634-011 EXCEPT THAT:
D205-634-045 REPLACES D205-634-041
D2580-045 REPLACES D2580-041

THE DIFFERENCE BETWEEN D205-634-011 (D205-634-041)
AND D205-634-015 (D205-634-045) IS THAT EXTRA
SPACERS HAVE BEEN ADDED AT LOCATIONS MARKED 'X' AND
ASSEMBLY IS PAINTED GREEN.



D205-634-015 (D205-634-045)

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WITHOUT NOTICE
WORK ORDER
NO. 42902A

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| W/O: | | WORK ORDER CHANGES | | | | | | |
|------|------|--------------------|--|----|------|-----|-------------------------------------|--------------------------|
| DATE | STEP | PROCEDURE CHANGE | | By | Date | Qty | Approval Chief Eng / Prod Mgr | Approval QC Inspector |
| | | | | | | | | |
| | | | | | | | | |

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

QA: N/C Closed: _____ Date: _____

| NCR: | | WORK ORDER NON-CONFORMANCE (NCR) | | | | | | |
|------|------|----------------------------------|-----------------------------|---------------------------------|----------------|---------------------------|-----------------------|--------------------------|
| DATE | STEP | Description of NC Section A | Corrective Action Section B | | | Verification Section C | Approval Chief Eng | Approval QC Inspector |
| | | | Initial Chief Eng | Action Description Chief Eng | Sign & Date | | | |
| | | | | | | | | |
| | | | | | | | | |
| | | | | | | | | |

NOTE: Date & initial all entries

DART

| | | | |
|-------------------------------|--------------------------------|--|------------------------|
| DESIGN <i>[Signature]</i> | DRAWN BY <i>[Signature]</i> | DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA | |
| CHECKED <i>[Signature]</i> | APPROVED <i>[Signature]</i> | DRAWING NO. D2580 | REV. D SHEET 1 OF 3 |
| DATE 07.02.27 | | TITLE 205 SKIDTUBE ASSEMBLY | SCALE NTS |
| A | 96.09.16 | NEW ISSUE | |
| B | 96.12.02 | AS MANUFACTURED | |
| C | 98.08.26 | REDRAWN, INCLUDED DEO 9094/9097 | |
| D | 07.02.27 | CHANGE TO SS WEARPLATES AND GASKETS, INCLUDE DEO 9124/9183 | |

RELEASED
07-06-28 *[Signature]*

| QTY -041 | QTY -045 | Part Number | Description |
|-------------|-------------|---|-------------------|
| X | | D2580-041 | SKIDTUBE ASSEMBLY |
| | X | D2580-045 | SKIDTUBE ASSEMBLY |
| | | | |
| 1 | 1 | D2500-1-190 | EXTRUSION |
| 1 | 1 | D2576-3 | STEP |
| 20 | 24 | D2579 | CROSS BOLT SPACER |
| 16 | 16 | D2594-1 | PLUG |
| 16 | 16 | D2594-3 | O-RING |
| 1 | 1 | D2596 | 205 WEB |
| 1 | 1 | D2855 | AFT CAP |
| 1 | 1 | D3564-5 | WEARSHOE |
| 1 | 1 | D3564-9 | WEARSHOE |
| 1 | 1 | D3564-11 | WEARSHOE |
| 1 | 1 | D3564-13 | WEARSHOE |
| 2 | 2 | D3566-1 | GASKET |
| 1 | 1 | D3566-5 | GASKET |
| 1 | 1 | D3566-13 | GASKET |
| | | | |
| 50 | 50 | ALS7-1032-130 or AKS7-1032-130 or AKS4-1032-130 or AELS-1032-130 | INSERT |
| 50 | 50 | AN3C4A | BOLT |
| 2 | 2 | AN3-5A | BOLT |
| 50 | 50 | AN960C10L | WASHER |
| 2 | 2 | AN960JD10L | WASHER |

GENERAL NOTES:

- 1) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 2) ALL DIMENSIONS ARE IN INCHES
- 3) INSERT D2596 WEB TO LOCATION SHOWN OFF AFT END OF SKIDTUBE AND BOND WEB INTO OUTER TUBE WITH NON-STRUCTURAL SIKAFLEX-241 ADHESIVE PER DART QSI 015 BEFORE BENDING. ENSURE HOLES LINE-UP.
- 4) BEND AS A SMOOTH RADIUS STARTING WITH A MAXIMUM CENTERLINE RADIUS OF 60 AND ENDING WITH A MINIMUM RADIUS OF 30. A MAXIMUM REDUCTION OF 0.200 IN DIAMETER IS ALLOWABLE IN THE BENT PORTION OF THE TUBE.
- 5) USE DART DRILL TEMPLATE TD2577-205 TO LOCATE AND DRILL Ø0.297 HOLES FOR WEARSHOE INSERTS. INSTALL ALS7-1032-130 PER SECTION D-D (50 PLACES) AFTER FINISH. INSTALL AN3C4A BOLTS AND AN960C10L WASHERS WITH SIKAFLEX-241/-291.
- 6) WELDING TO BE DONE PER DART QSI 004.
- 7) FINISH:
SEE NOTES ON
PAGE 2 FOR D2580-041 AND
PAGE 3 FOR D2580-045
- 8) INSERT D2594-1 PLUG C/W D2594-3 O-RING IN HOLES MARKED 'P' (BOTH SIDES OF TUBE) AFTER FINISH (16 PLACES).

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Diagram illustrating the cross-section of a circular beam with four vertical reinforcement bars. The diameter is 16 inches. The distance between the centerlines of the bars is 3.500 inches. The distance from the centerline of each bar to the inner edge of the concrete is 1.750 inches. The bars are shown with hooks at the top and bottom.

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07-06-28

Diagram illustrating the grinding locations for the D2576-3 step. The diagram shows a cross-section of the step with the following labels:

- GRIND FLUSH (4 PLACES)
- GRIND FLUSH
- D2576-3 STEP
- GRIND FLUSH
- LOCATION RIDGE ON UNDERSIDE OF D2576
- $\sqrt{1/4}$

Diagram illustrating the installation of the D2855 cap on the fuel tank. The diagram shows a circular fuel tank with a rectangular D2855 cap being secured by an AN3-5A bolt and an AN960JD10L washer. A sealant, SIKAFLEX-241/-291, is applied around the cap. A dimension of 0.40 is indicated for the distance from the bolt to the edge of the cap. A note specifies to drill prior to D2855 cap installation (2 places).

5

D2579 SPACER

D2596 WEB (REF)

ALS7-1032-130 (REF)
(TYP 50 PLACES)

AFTER DRILLING AND BENDING ASSEMBLY
PERFORM THE FOLLOWING FOR Ø0.508 HOLES ONLY:

1. CHAMFER HOLE 0.050 X 45°
2. INSERT D2579 SPACER (20 PLACES)
3. WELD INTO PLACE AND GRIND FLUSH
4. C'BORE D2579 SPACER TO Ø0.437 X 1.00 DEEP

i) FINISH: ACID ETCH, ALODINE PER DART QSI 005 4.1 PRIOR TO INSERTING D2596 WEB POWDER COAT ASSEMBLY GLOSS WHITE (REF. 4.3.5.1) PER DART QSI 005 4.3 BLACK ANTI-SKID PAINT AS INDICATED PER DART QSI 005 4.4

[illegible]

MAIN BODY ASSEMBLY DETAIL

WELD AS PER DETAIL B

BLACK ANTI-SKID TO 0.5 ABOVE LOCATION RIDGE

BLACK ANTI-SKID TOP OF STEP TO 0.5 ABOVE BOTTOM EDGE

0.5 1.5 1.5 D P P P P P P P

8

D3566-1 D3566-5 D3566-1 D3566-13

D3564-11 D3564-5 D3564-9 D3564-13

REFER TO DETAIL C

AN3C4A BOLT (1)
AN960C10L WASHER (1)
(50 PLACES)

| | | | |
|--------|----|----------|--|
| DESIGN | JJ | DRAWN BY | |
|--------|----|----------|--|

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| | |
|----------|-----------|
| DRAWN BY | <i>PH</i> |
| APPROVED | <i>H</i> |

DRAWING NO.
D2580

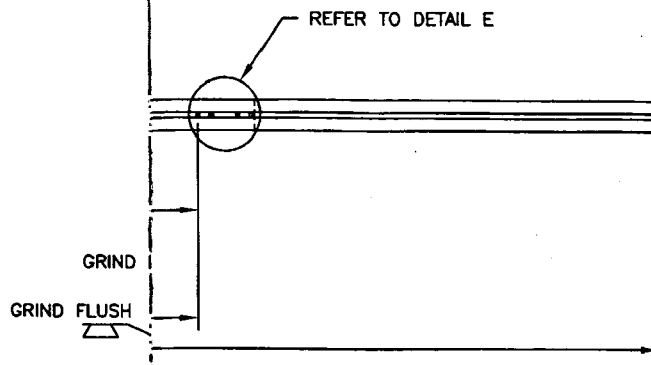
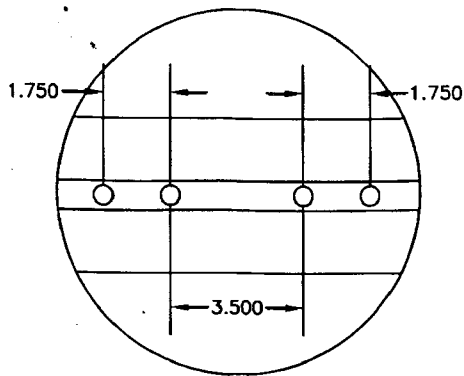
| |
|-----------------------|
| TITLE |
| 205 SKIDTUBE ASSEMBLY |

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HAWKESBURY, ONTARIO, CANADA

REV. D
SHEET 2 OF 3

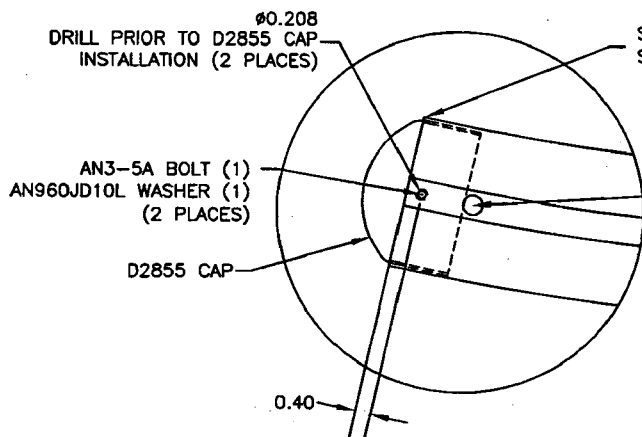
SCALE
1:24

DETAIL E
SCALE 5:24

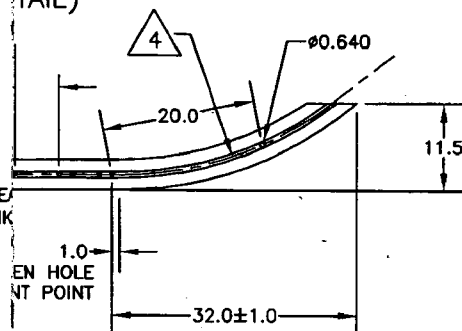


RELEASED
07 Dec 88

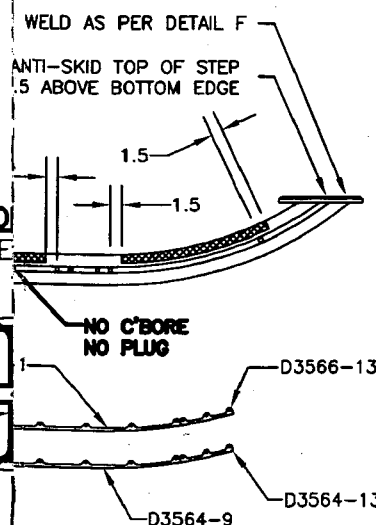
DETAIL G
SCALE 5:24



DETAIL F
(TAIL)



SECTION SCALE



D2579 SPACER

D2596 WEB (REF)

AL57-1032-130 (REF)
(TYP 50 PLACES)

C

D2580-045 NOTES

- FINISH: ACID ETCH, ALODINE PER DA
POWDER COAT ENTIRE ASSEM
BLACK ANTI-SKID PAINT AS
- IT IS ACCEPTABLE TO GRIND A RELIEF
WITH THE SPACER AT THIS LOCATION

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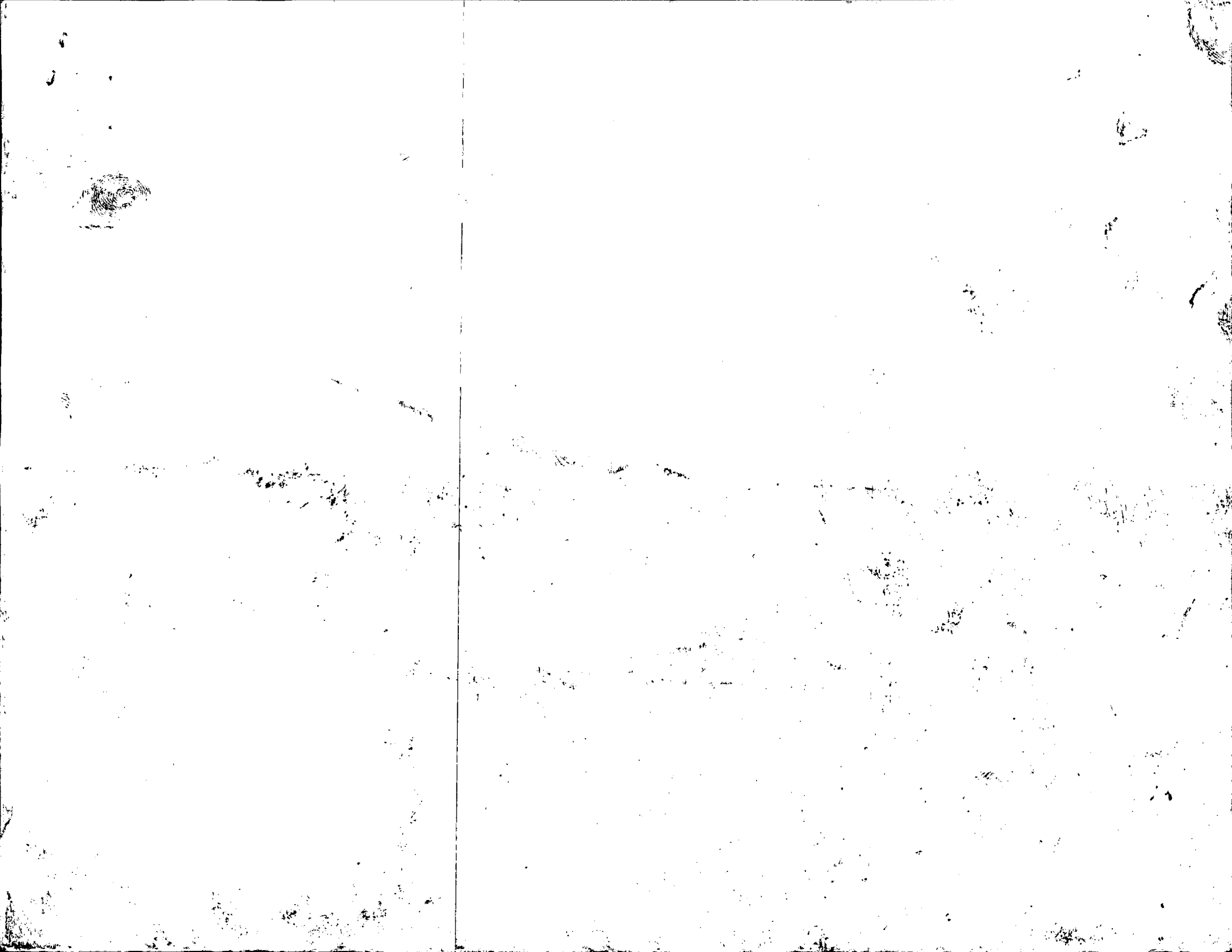
SHEET 3 OF 3

TITLE

205 SKIDTUBE ASSEMBLY

SCALE

1:24



NO. 182

**AWS D17.1.2001
QUALIFICATION TEST RECORD**

Name: Barclay Elliot
Job number: B43240 A
Part number: 1205 6/4 041
Description: 205 Skid tube
Welding Process: Tig[☒] Mig[]
Base material: Alum.
Current: AC[☒] DC[]

TEST REQUIREMENTS AND RESULTS

Visual: pass[☒] fail[]
Penetration: pass[☒] fail[]

UNACCEPTABLE

Cracks: pass[☒] fail[]
Undercut: pass[☒] fail[]
Pin holes: pass[☒] fail[]
Overlap (cold lap): pass[☒] fail[]
Porosity (surface): pass[☒] fail[]
Coloration: pass[☒] fail[]

Qualifier Leigh Dewal Date of Test Coupon 08/11/20
Welder Barclay Elliot Date of Test Coupon 08/11/20

The above named individual is qualified in accordance with AWS D17.1.2001 to weld